IN THE CLAIMS:

Please amend claims 29, 30 and 52 as follows:

1 - 28. (Cancelled)

29. (Currently Amended) A device for automated evolutionary assistance to air traffic controllers including a computer ~~including~~ having a software program permitting the receipt of data for equipping an air traffic control system including flight plans of aircraft and Radars and elaborating and displaying them to air traffic controllers, the controllers having a radiotelephony link for communicating with the aircraft, the device comprising:

–means for establishing a data-link with the aircraft;

–means for establishing and updating a computer agenda, which is a list of the aircrafts' conflicts, of potential conflicts on the basis of all the information and computation means of the computer;

–means for automatically collecting, via said data-link, in on-board aircraft computers, complementary data for establishing said computer agenda;

–means for selecting potential conflicts on crossing trajectories which can be solved by modification(s) of aircraft speed, climbing or descending rates, lateral shift of route, said modification(s) being so minor as to not interfere with current controllers'

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decision making processes;

—means for automatically transmitting said modification(s) of flight parameters via said data-link to selected aircraft and without the controllers' prior agreement, when said modifications of flight parameters staying stay within limits of the fuzziness of the controllers' vision and thereby being are "subliminal" to the controllers; and

—means for executing said modifications by automating means in said selected aircraft.

30.   (Currently Amended) The device according to claim 29, further including means for elaborating optimal solutions to other potential conflict conflicts figuring in said computer agenda.

31.   (Previously Presented) The device according to claim 29, further including means for determining in real time among conflicts within said controllers' agenda those which are false conflicts and displaying the false conflicts on a display of a sector in charge of implied aircraft.

32.   (Previously Presented) The device according to claim 29, further including means for updating potential conflicts into said computer agenda even before implied aircraft have entered in a control sector in which the conflict could happen.

33.   (Previously Presented) The device according to claim 29, further including means for selecting in said computer agenda particularly sensitive conflicts that lead to the occurrence of conflict clusters that are difficult to solve.

34.   (Previously Presented) The device according to claim 33, further including means for proposing solution(s) for avoiding such occurrence on a display screen of controllers presently in charge of the aircraft when said conflicts only occur in a following sector.

35.   (Previously Presented) The device according to claim 33, further including means for proposing to controllers, transfer conditions of an aircraft to a following sector.

36.   (Previously Presented) The device according to claim 29, further including means for displaying to controllers' icons in bi-univocal relationship with aircraft

pairs on said controllers' agenda, said icons serving as a virtual keyboard for addressing in return specific messages to the computer concerning said aircraft pairs.

37.   (Previously Presented) The device according to claim 36, further including means for displaying the aircraft pairs of said controller agenda, a specific icon that makes displaying the virtual keyboard specifically adapted to the situation when designated by the controllers.

38.   (Previously Presented) The device according to claim 30 further including means for displaying on said controllers' agenda an icon that indicates the controllers' desire to know the solution(s) elaborated by the computer and means for informing said computer of the chosen solution when designated by controllers or assistant controllers.

39.   (Previously Presented) The device according to claim 38, further including means for automatically transferring the chosen solution to concerned aircraft for execution.

40.   (Cancelled)

41.   (Cancelled)

42.   (Cancelled)

43.   (Previously Presented)   The device according to claim 29, further including means for elaborating a display making appear each aircraft pair in potential conflict on the form of a point and of its speed vector, the coordinates of said point being respectively the delay between the present moment and the moment when said aircraft pairs will have a minimum longitudinal separation, and in ordinates the separation distance at this moment.

44.   (Previously Presented)   The device according claim 43, wherein said device is further arranged for associating a label providing any necessary data concerning the aircraft with the point representing the aircraft pair.

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45.   (Previously Presented) The device according to claim 43, wherein said device is further arranged for associating an indicator giving their vertical separation when their horizontal separation will be minimum with the point representing the aircraft pair.

46.   (Previously Presented) The device according to claim 43, wherein a designation by a controller of an aircraft on any display screen makes the aircraft and an aircraft conflicting with it appear on other display screens.

47.   (Previously Presented) The device according to claim 39 further including means for receiving from said aircraft data confirming the proper execution of instructions.

48.   (Previously Presented) The device according to claim 47, further including means for sending a message to two conflicting aircraft for sub-delegating to the conflicting aircraft the responsibility of insuring their safe separation by their own means according to clearances defined by said device and chosen among a set of possible conflict resolution manoeuvres.

49.   (Previously Presented)   The device according to claim 48, further including means for insuring automatic display of the delegated conflict, so that said controllers' agenda provides a permanent monitoring board displaying a list of the delegated conflicts and a list of potential conflicts still to be solved.

50.   (Cancelled)

51.   (Cancelled)

52.   (Currently Amended) A method for automated evolutionary assistance to ~~an~~ air traffic controllers including a computer ~~including~~ having a software program permitting the receipt of data for equipping an air traffic control system including flight plans of aircraft and radars and elaborating and displaying them to air traffic controllers, the controllers having a radiotelephony link for communicating with the aircraft, the method comprising:

establishing a data-link with the aircraft;

establishing and updating a computer agenda, which is a list of the aircrafts' conflicts, of potential conflicts on the basis of all the information and computation means of the computer;

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automatically collecting, via said data-link, in on-board aircraft computers, complementary data for establishing said computer agenda;

selecting potential conflicts on crossing trajectories which can be solved by modification(s) of aircraft speed, climbing or descending rates, lateral shift of route, said modification(s) being so minor as to not interfere with current controllers' decision making processes;

automatically transmitting said modification(s) of flight parameters via said data-link to selected aircraft and without controllers' prior agreement, when said modifications of flight parameters staying stay within limits of the fuzziness of the controllers' vision and thereby being are "subliminal" to the controllers; and

executing said modifications in said selected aircraft.